III. AMENDMENTS TO THE CLAIMS

- *PLEASE FIND BELOW A MARKED VERSION OF CLAIMS WITH PRESENT STATUS DELINEATED*

    - *THE CLAIMS ARE HEREIN AMENDED, CANCELED, OR ADDED TO, SO AS TO EVENTUATE IN THE NEW SET OF PENDING CLAIMS INDICATED BELOW. THIS LISTING OF CLAIMS WILL REPLACE ALL PRIOR VERSIONS AND LISTING OF CLAIMS IN THE APPLICATION.*

-- The status of each claim is indicated after the claim number by use of a parenthetical identifier selected from: (Original), (Currently amended), (Canceled), (Withdrawn), (Withdrawn – currently amended), (Previously presented), (New), and (Not entered). Claim text is provided for each claim in the listing except for the claims status "canceled" or "not entered." Only claims having the status of "Currently amended" or "Withdrawn – currently amended" include markings to indicate changes that have been made relative to the immediate prior version of the claims. The text of any deleted matter is shown by strike-through, except that double brackets placed before and after deleted characters of five or fewer consecutive characters may be used. The text of any added subject matter is shown by underlining the added text. Claims that were previously canceled that are reinstated here, if any, are reinstated by adding the claim as a "(New)" claim with a new claim number.

WHAT IS CLAIMED IS:

1. **(CURRENTLY AMENDED)** An IC card comprising:

a substrate~~, said substrate having~~ with a semiconductor integrated circuit and one or more optical data deformations incorporated therein that are representative of digital data; and

optical state change security material formed as a layer over said optical data deformations. ~~the optical data deformations being associated with a transient optical state change security material.~~

2. - 3. **(CANCELED)**

4. **(CURRENTLY AMENDED)** The IC card of claim 1 wherein ~~the~~ said transient optical state change material is associated with ~~the~~ said optical data deformations to provide at least two optical data reads when ~~the~~ said optical data deformations are read by an optical reader.

5. **(CURRENTLY AMENDED)** The IC card of claim 4 wherein each of ~~the~~ said optical data reads is indicative of valid data.

6. **(CURRENTLY AMENDED)** The IC card of claim 4 wherein one of said optical data reads is indicative of valid data, while the other of said optical data reads is indicative of invalid data.

7. **(CURRENTLY AMENDED)** The IC card of claim 4 wherein each of the said optical data reads is invalid.

8. **(CURRENTLY AMENDED)** The IC card of claim 4 wherein ~~the~~ said optical data deformations comprise pits and lands.

9. **(ORIGINAL)** The IC card of claim 8 wherein said pits comprise pits of two distinctly different depths.

10. **(CURRENTLY AMENDED)** The IC card of claim 8 wherein said pits act ~~at least one pit acts~~ as a Fabry-Perot type interferometer.

11. **(CURRENTLY AMENDED)** A method for authenticating an item comprising the steps of:

(a) detecting on said ~~an~~ item, or a substrate associated with ~~the~~ said item, ~~or~~ an ~~transient~~ optical state change security material in the form of a layer over ~~associated with~~ an optical data deformation[[,]];

(b) determining the locations of said optical ~~such~~ state change material[[s]] on ~~the~~ a reference authentic item or substrate associated with ~~the~~ said reference authentic item[[,]]; and

(c) declaring ~~the~~ said item as authentic when ~~such detection occurs and the~~ said transient optical state change security material is found at ~~the same~~ said locations. ~~as an authentic item.~~

12. **(CURRENTLY AMENDED)** The method of claim 11 wherein ~~the~~ said transient optical state change material is associated with ~~an~~ said optical data deformation in a manner to change an optical read of ~~the~~ said optical data deformation between at least two optical states when ~~the~~ said optical data deformations are read by an optical reader.

13. **(CURRENTLY AMENDED)** The method of claim 11 wherein ~~the~~ an optical data change is transient as ~~the transient~~ said optical state security change material reverts back from ~~an~~ second optical state to an initial optical state within a time interval.

14. **(CURRENTLY AMENDED)** The method of claim 12 wherein ~~the~~ said optical deformations comprise pits of distinctly different depths ~~so as~~ configured to ~~control~~ modify reflectivity. ~~of the reader light.~~

15. **(CURRENTLY AMENDED)** The method of claim 13 wherein the time interval between said second and said initial optical states may be predetermined.